



## Visitor Programs and Events

Fall 2017

### Sandy Hook, New Jersey

#### Resilience

Resilience is defined as “the ability to recover from difficulties; toughness.” New York City, in particular and those who live in these nearby coastal areas, have had plenty of practice in resilience.

New York City is an urban coastal city and it is susceptible to hazards associated with water. There have been many coastal storms that have damaged our area; the combination of wind and rain often coupled with high tides have wrought severe damage to coastal areas. In 2011 Hurricane Irene had top recorded winds of 70 mph that left 400, 000 New York City area residents without power.

But then, five years ago, on October 29, 2012, there was Sandy. As a late season hurricane combined with a Nor’easter that struck land at high tide during a full moon, Sandy was the largest hurricane this area has ever known, with winds topping 100 mph and a record 14.41 foot storm surge (recorded at Battery Park), causing major flooding in various parts of New York City and the surrounding area, including most tunnels for roads and subway.

Sandy’s devastation included NPS sites in four states in the Northeast Region, along the Eastern Seaboard, causing significant natural resource and facility damage. The Sandy Recovery Improvement Act of 2013 awarded some 300 million dollars for the repair, rehabilitation and replacement construction of facilities damage to the NPS units including; in our area, Statue of Liberty, Ellis Island, Governors Island, Fire Island Seashore, and of course, Gateway.



*This was a typical scene at Sandy Hook a few days after Hurricane Sandy. NPS photo.*

While many Sandy resource and facility damages have been repaired, more than fifty projects are still ongoing and moving towards completion as we come to the five year anniversary of the storm. Many of these projects are readily apparent and many of you have watched as these repair and construction projects have progressed. It should be noted that many repairs, when possible, incorporated resilience repair designs to accommodate future severe weather events. For example, at Riis Park the Bath House repairs have included the replacement with an exterior masonry wall with an iron fence that would sustain a storm surge event. And in the Bath House, the installation of interior components and finishes that can sustain flooding and permit storm surge to flow through have been used. The repair of the breach at the West Pond Trail at Wildlife Refuge was reinforced with corrugated steel seawall to

make the breached spot sturdier. Many other projects, particularly sand relocation, and roads and paving repairs are readily apparent especially at Sandy Hook.

However, resilience was on the minds of many, even prior to the Hurricane Sandy. During the summer of 2012, the City of New York and the National Park Service came together to sign an agreement to co-manage Jamaica Bay, a unit of the Gateway National Recreational Area, and restore roughly 10,000 acres of public parks, green spaces and watershed for educational, recreational and ecosystem purposes. The priority of this initiative was highlighted most recently in the Office of Resilience and Recovery’s *A Stronger, More Resilient New York*,

New York City's comprehensive plan to strengthen the city's infrastructure and protect our communities against severe weather.

Interior Secretary Sally Jewell additionally recognized the importance of the Jamaica Bay partnership as an extension of President Obama's America's Great Outdoors Initiative. The vision for a grand, unified park that underpins this partnership has many components, including the establishment of a world-class institute to facilitate an exchange of information among scientists, managers, policymakers, and community leaders on issues of coastal and urban resiliency relevant to cities around the world.

The expansion of these actions and commitments coincided with ongoing efforts of interested scientists and researchers, community leaders, decision-makers, and stakeholders who were already beginning to think about how disturbances in the Jamaica Bay social and ecological systems could lead to negative changes in the region. Each of these efforts was the impetus for systematically assessing and understanding how to make the system more resilient to potential disturbances. Prior to Hurricane Sandy, the groundwork was already set for the establishment of the *Science and Resilience Institute at Jamaica Bay*. This new institute was intended to provide a home for much of the important applied research now underway in the region – bringing together scientists, community members, and policymakers committed not only to restoring Jamaica Bay, but also to using it as a place to explore broader issues of coastal resilience.

That goal has taken on even greater urgency in the wake of the Hurricane Sandy's impact. The hurricane was a reminder that action is needed now. It has focused greater attention on the Jamaica Bay region, representing a historic moment for science engagement. In response, scientists, policy makers, and community activists have come together to create the Science and Resilience Institute at Jamaica Bay.

The Science and Resilience Institute produces integrated knowledge that increases biodiversity, well-being, and adaptive capacity in the coastal communities and waters surrounding Jamaica Bay and New York City. It nurtures and supports world-class research on the resilience of Jamaica Bay that can inform management both of the bay and beyond. The City of New York and National Park Service have partnered in this endeavor with a consortium led by the City University of New York and including many of the area's research universities as well as key local institutions. With this partnership, much of the Sandy damage has been repaired or is nearing completion as we come to the five year remembrance/ anniversary. Most of these projects are readily apparent and many of you have watched as these repairs and construction have progressed and some have been noted above.

Additionally, there has been much cutting-edge research done to further our understanding of resilience in urban coastal ecosystems, with the focus on Jamaica Bay. Restoring and enhancing resilience of national parks in the post-Sandy environment is essential as they provide significant habitat for fish and wildlife resources, provide recreational resources and serve to protect the best examples of our cultural heritage. The scientific advances have developed new information and tools to better to manage coastal resources, better predict the impact of climate change on urban ecosystems, and enhance the ability to response to major catastrophic events such as Hurricane Sandy. Solving these immense coastal issues requires strong collaborative approaches.

For this fall's Herbert Johnson lectures presented at the Wildlife Refuge, we are calling upon our esteemed colleagues at Science and Resilience Institute at Jamaica Bay to speak on Resilience.

These talks will occur on Sundays, at 2 PM, on 1, 15, 22 October with a "Resiliency Walk" to happen on the 29th of October, the fifth anniversary of Sandy's devastating strike.

Stay tuned for the details which will be announced as soon as they are complete.

*Do you receive email notifications of Gateway's programs and events? If you are not on our mailing list and would like to be, please send a message to [Charles.Markis@nps.gov](mailto:Charles.Markis@nps.gov), with 'program guide' in the subject line and we will add you.*

*The ♥symbol denotes a hike or walk of moderate activity. Improve your health, as you enjoy your park.*

— C. Markis 8-14-17

## **Sandy Hook Visitor Center Lighthouse & Keepers Quarters**

### **Visitor Center Hours:**

Daily, 9 AM – 5 PM, May 1 – Oct. 31  
Daily, 10 AM – 4 PM, Nov. 1 – April 30

### **Lighthouse Tours:**

Daily, 1 PM to 4:30 PM, May 1 – Oct. 31  
Daily, 1 PM to 3:30 PM, Nov. 1 – April 30  
Tours are first-come, first-served. Visitors must be 48 inches tall to climb the tower. Sign up in the 1883 Keeper's Quarters for free lighthouse tours, and see exhibits on New Jersey lighthouses, a rotating art exhibit, and visit the gift shop. Grounds and video in adjacent barn are always open. Groups must make advance reservations. Call (732) 872-5970 for more information.

### **Eastern National Gift Shop**

Visitor Center/Keepers Quarters  
Daily, 9 AM – 5 PM, May 1 – October 31  
Daily, 10 AM – 4 PM, Nov. 1 – April 30

### **History House**

Fort Hancock's Officers Row, Building 1  
May 1 – Sept. 30: Daily, 1 PM – 5 PM  
Oct. 1 – April 30: Weekends, 1 PM – 5 PM  
An 1898 lieutenant's quarters on "Officers Row" overlooking Sandy Hook Bay is furnished to the WWII era, the busiest time in the fort's history.

### **Battery Potter**

Saturday, September 2, 9, 16, 23, 30:  
1 PM - 4:30 PM

Sunday, September 3, 10, 17, 24:  
1 PM - 4:30 PM

Sunday, October 15: 1 PM – 4:30 PM  
Explore and tour one of Sandy Hook's oldest gun batteries. Completed in 1895 it was the first concrete disappearing gun battery built in the United States.

### **Mortar Battery**

Saturday, September 2, 9, 16, 23, 30  
1:30 PM – 4:30 PM

Sunday, September 3, 10, 17, 24,  
1:30 PM – 4:30 PM

Sunday, October 15: 1:30 PM – 4:30 PM  
Completed in 1894 the Sandy Hook Mortar Battery was the first Endicott Era concrete mortar battery built in the United States as part of New York Harbor's defense against enemy attack from the sea

### **Nike Missile Radar Site**

Parking Lot L, Horseshoe Cove  
Saturday, September 9 & 30, 12 PM – 4 PM  
Sunday, September 17, 12 PM – 4 PM  
(Cold War Day)  
Saturday, October 7, 12 PM – 4 PM

Sunday, October 15 & 29, 12 PM – 4 PM  
(Fort Hancock Day)

Saturday, November 4 & 11, 12 PM – 4 PM

Guided tours of the Integrated Fire Control (IFC) will allow you to see the inner workings of the facility where the supersonic nuclear armed Nike Hercules missiles were controlled and guided using Cold War era computers and radars. While taking a guided tour of this one-time TOP SECRET missile site, you will have the opportunity to meet and talk with some of the veterans who actually worked on the Nike Air Defense System. ♥ 1/4 mile.

### **Yoga on the Beach**

Beach E, Center Chute  
9 AM – 10 AM

Saturday, September 2, 9, 16, 23 & 30  
Begin your Saturday with a peaceful, yet vigorous, traditional Vinyasa yoga practice on the beach. The practice is open to everyone and all levels, from beginners to advanced, and will focus on flowing through basic poses and maintaining them with proper alignment. As this will be on the beach. Best to bring a large, sturdy beach blanket to practice on and wear light, comfortable workout attire that moves with you and can absorb sweat...or wear your bathing suit, choice is yours! Hydration is also important, so please bring your own water (refillable bottles.) The practice will be led by Tony Costa, a certified yoga teacher (RYT 200), Zen Buddhist and martial artist. He is trained in Hatha Yoga and studied at Evenflow Yoga in Red Bank under Christian Valeriani, a student of Dharma Mittra.

### **Boy Scout Merit Badge Program Environmental Science**

New Jersey Sea Grant Consortium  
Building #22, Fort Hancock  
Call for Date

Discover the ecology of Sandy Hook's maritime environment in this highly interactive five-hour program at Sandy Hook, conducted both outdoors and in the NJSGC laboratory classroom. Open to all individual boy scouts. Advance registration required. Register online at [www.njseagrant.org/education/scout-programs](http://www.njseagrant.org/education/scout-programs) or contact Jody Sackett: [JSackett@njseagrant.org](mailto:JSackett@njseagrant.org) or 732-872-1300, ext. 20. Fee.

### **Boy Scout Merit Badge Program Oceanography**

New Jersey Sea Grant Consortium  
Building #22, Fort Hancock  
Call for Date

Explore Sandy Hook and experience the science of the ocean "hands-on" during this four-hour program, conducted both outdoors and in the NJSGC laboratory classroom. Open to all individual boy scouts. Advance registration required. Register online at [www.njseagrant.org/education/scout-programs](http://www.njseagrant.org/education/scout-programs) or contact Jody Sackett: [JSackett@njseagrant.org](mailto:JSackett@njseagrant.org) or 732-872-1300, ext. 20. Fee.

## **SEPTEMBER PROGRAMS**

### **Canoeing on Sandy Hook Bay**

U.S. Life-Saving Station Parking Lot  
(between Lot D and Lot E)

Saturday, September 2  
9:15 AM – 12 PM

Take a two-mile morning paddle to explore Sandy Hook Bay from an ideal vantage point—the water itself. Rangers guide a two and a half hour tour of the bayside waters and Skeleton Hill Island. Free. Call 732-872-5970 to reserve.

### **Battery Gunnison/ New Peck Restoration**

Saturday, September 9  
12 PM – 5 PM

The Army Ground Forces Association is a volunteer group in 1943 coast artillery uniforms restoring and interpreting Battery Gunnison/New Peck and it's 6-inch guns. Visitors are invited to stop by on this work and training day to chat and learn about the historic time period of September 1943 and the restoration and preservation projects currently underway.

### **Harvest Moon Walk**

U.S. Life-Saving Station Parking Lot  
(between Lot D and Lot E)

Friday, September 8  
7 PM – 8:30 PM

"Harvest Moon" is the full moon closest to the autumnal equinox. Bring a flashlight for this night walk that utilizes the five senses. Call (732) 872-5970 to make reservations. ♥ 1 mile.

### **Cold War Day**

Lot L, Horseshoe Cove  
Sunday, September 17  
12 PM – 4 PM

Tour a Nike Missile Radar Site (located opposite Horseshoe Cove Parking Lot L) and Nike Missile Launch site (located one mile south of the Nike Radar Site) with the Nike NY-56 volunteers who have restored many of the buildings to the time of the Cuban Missile Crisis in 1962. Learn why these sites were essential to national security in the Cold War era.



### **Canoeing on Sandy Hook Bay**

U.S. Life-Saving Station Parking Lot  
(between Lot D and Lot E)

Sunday, September 17

9:15 AM – 12 PM

Take a two-mile morning paddle to explore Sandy Hook Bay from an ideal vantage point—the water itself. Rangers guide a two and a half hour tour of the bayside waters and Skeleton Hill Island. Free. Call 732-872-5970 to reserve.

### **Fall Equinox Walk**

Building #18, Fort Hancock

Friday, September 22

6 PM – 8 PM

It is called the equinox because it's one of only two days in the year when daylight and darkness agree to equally share the 24 hours in a day. Truth or myth – can you balance a raw egg on its end? Not sure, but it's a great day for an early evening walk on the Hook. Free, call the American Littoral Society at (732) 291-0055 to make reservations. ♥ 1 mile.

### **Canoeing on Sandy Hook Bay**

U.S. Life-Saving Station Parking Lot  
(between Lot D and Lot E)

Saturday, September 23

9:15 AM – 12 PM

Take a two-mile morning paddle to explore Sandy Hook Bay from an ideal vantage point—the water itself. Rangers guide a two and a half hour tour of the bayside waters and Skeleton Hill Island. Free. Call 732-872-5970 to reserve.

### **Junior Ranger Naturalist**

North Beach - Beach Pavilion

Sunday, September 24

1 PM – 3 PM

Collect natural materials from the beach and make you own wind chime. A park ranger will provide the materials and assist with the project.

## **OCTOBER PROGRAMS**

### **Monarch Butterfly Walk**

U.S. Life-Saving Station Parking Lot  
(between Lot D and Lot E)

Saturday, October 7

10 AM – 11:30 AM

This remarkable insect, whose migration route ends in Mexico, is featured on a ranger-led tour. Please call 732-872-5970 to make reservations. ♥ 1 mile.

### **Fall Bird Walk**

#### **International Migratory Day**

Monmouth County Audubon Society

Spermaceti Cove Parking Lot (between Lot D and Lot E)

Saturday, October 14

10 AM – 12 PM

Join our 2-hour walk in search of arriving fall waterfowl, hawks, and the spectacle of migration when many birds leave North America for the winter. Wear comfortable shoes and bring binoculars. Free. ♥ 2 miles.

### **New Jersey Lighthouse Challenge Weekend**

Sandy Hook Lighthouse

Saturday, October 21, 8 AM - 6 PM

Sunday, October 22, 8 AM - 6 PM

The Sandy Hook Light is one of the 11 New Jersey Lighthouses along the Atlantic coastline and Delaware Bay open for tours this weekend. This annual event is sponsored by the NJ Lighthouse Society. For more information, visit <http://www.njlhs.org>.

### **Fall Beach Sweep**

Clean Ocean Action

Lot D

Saturday, October 21

9 AM - 12:30 PM

Clean Ocean Action's Beach Sweeps are a biannual, statewide beach cleanup that occurs at over 70 locations throughout the state of NJ. Each beach sweeper becomes a citizen scientist for the day as they record each piece of debris that they collect. This turns a one-day, cleanup event into a legacy of data that impacts research and legislation. Bring gloves, attend rain or shine, and dress for the weather. Closed, hard-soled shoes are recommended. For more information, please visit Clean Ocean Action's website [www.CleanOceanAction.org](http://www.CleanOceanAction.org) or call 732-872-0111.

### **Spooky Tales/ Ghosts of Historic Fort Hancock**

American Littoral Society

Building #18, Fort Hancock

Friday, October 27

7 PM - 9 PM

Get into the Halloween Spirit on this moonlight walk around Historic Fort Hancock where ghosts have been known to linger. Cider and fall snacks will be provided. Bring flashlights. Cost: \$5 per person. Call (732) 291-0055 for more information and to make reservations. ♥ 2 miles.

## **NOVEMBER PROGRAMS**

### **Holly Forest Ramble**

U.S. Life-Saving Station Parking Lot  
(between Lot D and Lot E)

Saturday, November 4

2 PM – 3:30 PM

A ranger-led walk through Sandy Hook's maritime holly forest at a prime time to visit the area. Learn how the plants and animals in this habitat adapt to extreme climate conditions. ♥ 1 mile.

### **Bird Banding**

Monmouth County Audubon Society

Saturday, November 11

8 AM – 10 AM

Join Tom Brown to observe birds and learn about this long-term bird banding project. Free.

### **Surf Fishing Clinic**

Building #18, Fort Hancock

Saturday, November 18

8 AM – 3 PM

Join American Littoral Society Tagging Director, Jeff Dement, for a day of surf fishing and instruction on the beach at Sandy Hook. Instructional skills include casting, knot tying, lure/bait selection, and "reading" a beach. All skill levels are welcomed. Rods, reels and tackle will be provided, but bring your own equipment if you have it. Children under 18 are welcome with a supervising adult. Coffee and doughnuts will be provided but please bring your lunch. Space is limited. Call (732) 291-0055 for more information and to make reservations. Fees: \$20 per Member Family, \$60 per Non-Member Family.

### **Stars of Sandy Hook "Full Beaver Moon"**

Lot E Beach Pavilion

Saturday, November 4

6 PM – 9 PM

The moon will be located on the opposite side of the earth as the sun and its face will be fully illuminated. This moon was known by early Native American tribes as the Full Beaver Moon because this was the time of year to set the beaver traps before the swamps and rivers froze. Join a park ranger and the STAR Astronomy Society to view the night sky. Telescopes are set up. Bring telescopes and/or binoculars.

## **FORT HANCOCK DAYS WEEKEND**

Mark the anniversary of the 1895 establishment of Fort Hancock and discover the fort's role in the defense of our nation.

### **Lantern Tour**

#### **World War II Harbor Defense**

Fort Hancock Museum/Guardhouse

Friday, October 13

6:30 PM - 9 PM

Volunteer living historians from the Army Ground Forces Association (AGFA) in uniform as World War II coast artillery soldiers will take you for a walk that includes several seacoast gun batteries of Fort Hancock, highlighting the restored Battery Gunnison/New Peck. Bring a flashlight. ♥ 1.5 miles

### **Fort Hancock Day**

Battery Gunnison/New Peck

Sunday, October 15

12 PM – 4:30 PM

Join us as we commemorate the renaming of the “Fortifications at Sandy Hook” to “Fort Hancock” in October 1895. As part of this commemoration, volunteers from the Army Ground Forces Association uniformed as World War II era Coast Artillery soldiers will bring Battery Gunnison/New Peck and its 6-inch guns to life as they were in October 1943. See the fully restored 1920s to 1940s vintage interior electric system, and learn about Fort Hancock Army medical support. Learn how the Army planned to counter chemical weapons with the fully restored Chemical Decontamination and Overpressure system. Learn about 1940s metal working machines and see machinists making parts to repair or replicate historic items. Participate in loading the guns, tracking ships, learn “artillery math” and experience a soldier's life at Ft. Hancock in October 1943.